

Appl. No.: 10/687,389
Response dated December 12, 2005
Reply to Office Action of August 11, 2005

REMARKS/ARGUMENTS

The Office Action of August 11, 2005 has been carefully reviewed and these remarks are responsive thereto. Claims 1-12, 14-28, 30 and 32-43 are pending. Claims 33-43 are new. Claims 13, 29 and 31 are cancelled. Claims 1-32 were rejected under 35 U.S.C § 102(e) as being anticipated by U.S. Patent No. 6,678,548 to Echauz *et al.* ("Echauz").

In response, Applicants respectfully traverse the rejection in light of the following remarks.

Amendments to the Specification

Minor typographical errors found in the specification have been corrected in response to the Examiner's request and entry of these minor changes is respectfully requested.

Cancelled Claims

Claims 13, 29 and 31 have been cancelled, therefore the rejection of these claims is considered moot. The cancelling of claims 13, 29 and 31 is without prejudice the filing of similar claims in a continuation application.

New Claims

Claims 33-43 are new. Support for these claims is at least found in paragraphs 186-204 of the specification as filed, thus no new matter has been added. Independent claim 33 is believed to be patentable over the references of record because the references of record fails to disclose the method of claim 33. Claims 34-37 depend from claim 33 and are patentable over the references of record for the reasons supporting claim 33 and for the additional limitations recited therein. Independent claim 38 is believed to be patentable over the references of record because the references of record fail to disclose the method recited in claim 38. Claims 39-43 depend from claim 37 and are patentable over the references of record for the reasons supporting claim 37 and for the additional limitations recited therein. Therefore, all the newly added claims are believed to be in condition for allowance and notification of the same is respectfully requested.

Amendment to the Claims

Claims 1-12, 14-28, 30 and 32 have been amended to clarify their intended scope and to

Appl. No.: 10/687,389
Response dated December 12, 2005
Reply to Office Action of August 11, 2005

revise minor informalities.

Claim 1 has been amended to clarify that a neurological event, which is the result of typical detection process on a neurological signal, is being further processed. Claims 2-12 and 14 have been amended to correspond to the amendments in claim 1.

Claim 15 has been clarified by amending it to recite a means for processing configured to do the steps previously recited as being computer executable instructions. Claims depending from claim 15 have been amended to correspond to the amendments to claim 15.

Rejection under 35 U.S.C § 101

Claims 15-32 were rejected under 35 U.S.C. § 101 as being directed towards nonstatutory subject matter. In response, claim 15 has been amended to recite "a means for processing configured" Applicants respectfully submit the amended independent claim 15 (and claims 16-28, 30, and 32 that depend from claim 15) are directed towards statutory subject matter pursuant to 35 U.S.C § 101 and respectfully request withdrawal of this ground of rejection.

Rejection under 35 U.S.C. § 102(e) – Echauz

Claims 1-32 were rejected under 35 U.S.C. § 102(e) as being anticipated by Echauz. Claims 13, 29 and 31 have been cancelled, thus mooted the rejection of these claims. Claims 1 and 15 are independent.

Claim 1 has been amended to recite "(a) determining that a sensed neurological signal represents at least one neurological event;" and "(b) identifying at least one feature of the at least one neurological event to use in scoring." Applicants respectfully submit that Echauz fails to disclose the second step.

Echauz explains that it is directed toward a method and apparatus for predicting and detecting epileptic seizures. (Echauz, Abstract). Echauz goes on to explain that a probability algorithm allows for improvements in detection by using a dual time frame of short term and long term analysis so as to help circumvent performance versus prediction-horizon limitations of single-resolution systems. (Echauz, Abstract). Echauz further explains that detection of impending seizures can serve to modulate treatment levels, thus allowing the patient to enjoy an

Appln. No.: 10/687,389
Response dated December 12, 2005
Reply to Office Action of August 11, 2005

improved quality of life. (Echaz, Abstract). Thus, Echaz is directed toward detection of seizures before they happen.

As noted above, independent claim 1 recites determining that a sensed neurological signal represents at least one neurological event. A possible example of this determination in (a) would be to use the method disclosed in Echaz to detect a seizure. Thus, Echaz could be argued to be directed toward a method of performing the feature recited in (a) of claim 1. However, Echaz fails to disclose further processing of the detected neurological event as recited in claim 1. In other words, Echaz is, at most, merely directed to the first step in a series of steps recited in independent claim 1.

As Echaz is directed toward detecting the seizure, Applicants respectfully submit that Echaz fails to disclose identifying a feature of the detected event. Indeed, Echaz provides no reason to do post analysis of the detected seizure because Echaz discloses making changes to treatment in prior to the occurrence of the neurological event. Thus, once the neurological event has occurred, the teaching provided by Echaz has already been used. Furthermore, as Echaz does not disclose identify features of neurological events, Applicants respectfully submit Echaz necessarily fails to disclose the scoring of the neurological events using the feature as recited in claim 1. For example, an embodiment of scoring a neurological event is provided in paragraphs 190-201 and Echaz fails to disclose a similar type of scoring of a neurological event.

Accordingly, as Echaz does not actually disclose identifying a feature of the neurological event or the additional processing of the neurological event such as scoring or ranking as recited in independent claim 1, Echaz cannot fairly be said to anticipate claim 1.

Claims 2-12 and 14 depend from independent claim 1 and are not anticipated by Echaz for at least the reasons discussed with respect to claim 1 and for the additional features recited therein.

For example, claim 2 recites the neurological event being selected from a detection cluster or a reported event and Echaz fails to disclose these types of neurological events.

Claim 9 recites the feature of allowing the user to exclude a neurological event. While the Office Action suggested that manually turning on and off the system of Echaz is equivalent, Applicants respectfully disagree. To exclude a neurological event necessarily requires the

Appl. No.: 10/687,389
Response dated December 12, 2005
Reply to Office Action of August 11, 2005

neurological event to be detected and Echauz could not detect a neurological event while off. Therefore, Echauz, at most, discloses excluding neurological signals.

Claim 11 recites "computing a relative severity minimum...." The Office Action suggested that such a computation is disclosed in Columns 4 and 5 of Echauz. However, the cited sections of Echauz merely provide details for detecting a seizure. In other words, the cited sections of Echauz at most provide support for a method of detecting a neurological event, not the computing of a relative severity minimum of the neurological event after the neurological event has been detected.

Independent claim 15 recites a means for processing that is configured to perform functions similar to what is claimed in independent claim 1 and therefore claim 15 is not anticipated for reasons similar to the reasons supporting the novelty of claim 1.

Claims 16-28, 30 and 32 depend from claim 15 and therefore are not anticipated for the reasons discussed with respect to claim 15 and for the additional features recited therein.

Accordingly, withdrawal of this ground of rejection is respectfully requested.

Appln. No.: 10/687,389
Response dated December 12, 2005
Reply to Office Action of August 11, 2005

CONCLUSION

All rejections have been addressed. Applicant believes all pending claims are in condition for allowance and earnestly solicits prompt notification of the same.

Respectfully submitted,

BANNER & WITCOFF, LTD.

Dated: December 12, 2005

By: 

Binal J. Patel
Reg. No. 42,065

Banner & Witcoff, Ltd.
10 South Wacker Drive
Suite 3000
Chicago, IL 60606
Tel: (312) 463-5000
Fax: (312) 463-5001